

INTRODUCTION TO ZERO DISCHARGE OF HAZARDOUS CHEMICALS (ZDHC)

H & M

- Background – H&M’s work & achievements in chemical management
- Greenpeace’s campaigns
- Why is this important?
- H&M’s commitment
- Our action plan – Joint roadmap
 - Joint roadmap activities
 - H&M’s individual action plan
- Summary
- What to expect next

Background

*'It can take a lot of chemicals to make clothes. However, hazardous chemicals can harm the global environment as well as the health of our customers, employees and workers throughout our value chain. Therefore, **we are working hard to ensure that our products are safe and to eliminate discharges to water, soil and air throughout the life cycle of all of our products.'***

[Chemical Management, H&M](#)



Background (cont.)

‘Since 1995 H&M has been working practically to reduce the use and impact of hazardous chemicals using an approach based on the Precautionary Principle.’

Achievements:

- *First Chemical Restriction list published in 1995 ; it has been updated 10 times since then, most recently in 2009.*
- *Phase out of PVC in 2002*
- *Publicly engaging with Greenpeace in 2005 in a lobbying campaign for a stricter chemical legislation in EU*
- *In 2005 setting up of audit process intended to shift focus from testing final products to chemicals management in factories to ensure restricted substances are controlled and avoided from the very beginning*
- *As member of AFIRM’s steering committee, working with others to educate suppliers and promote a responsible chemicals management from 2006 and onwards*
- *From 2008 and onwards, H&M is engaging with the UN to develop global general practice for spreading information on chemicals in products.*
- ***H&M was the first major retailer to ban the use of Nonylphenol ethoxylates in 2009***
- ***H&M initiated in 2009 an industry wide project to develop a harmonized test method for Nonylphenol ethoxylates, finalized in 2010***
- *H&M was the first major retailer to offer fluorocarbon-free garments with water repellent functional fabrics in 2010*

[Towards ZDHC](#)

‘H&M’s Chemicals Management includes one of the most stringent [chemical restrictions](#) in the apparel sector. H&M also makes sure that these restrictions are understood and applied in its supply chain.’

[Chemical Management, H&M](#)

Greenpeace's campaigns



Date: Jul 2011

[Case: Unraveling the corporate connections to toxic pollution in China](#)

Methodology: Waste Water testing

Key point: Greenpeace (**GP**) uncovered links between *the Younger Group* (found to be discharging toxic chemicals) and a number of major clothing, fashion and sportswear brands including H&M.



Date: Aug 2011

[Case: Unraveling the toxic trail from pipes to products](#)

Methodology: Product Testing

Key point: GP purchased garments from major retailers and brands (found in connection to the Younger group in the first campaign) and tested them for NPE. 4 out of 6 products tested positive, results ranged from 3.1ppm to 21ppm. All within the H&M NPE limit of 100 ppm.



Date: Sept 2011

[Case: Clickers and Stickers make H&M detox](#)

Methodology: Petitions through social media (facebook and twitter) and Stickers on H&M's shop windows

Key point: Prior this campaign, Nike, Adidas and Puma had already committed to 'detox' by 2020, and GP wanted H&M to join also. They therefore started petitions and placed stickers on our windows in 12 countries.



Date: March 2012

[Case: How big brands are making customers unwitting accomplice in the toxic water cycle](#)

Methodology: Product testing

Key point: GP illustrated how NPEs remain in many clothing items sold by major retailers and brands, and when washed, a significant percentage of the chemicals in these clothes is released and discharged into rivers, lakes and seas. As this can happen wherever in the world the items are being sold and washed, GP claims that brands are making their consumers unwittingly pollute their public water supplies.

Why is this important?

*'These hazardous chemicals pose long-term threats to human health and the environment. What makes many of these chemicals so dangerous is that they do not only persistent (meaning that they do not readily break down in the environment), but also **bio accumulative** (meaning that they can build up in the food chain and can have serious, long-term effects on the organisms that ingest them). Some are able to interfere with hormone systems in people and wildlife, **even at very low doses**, while others are carcinogenic or reprotoxic.'*

[p.6 Dirty Laundry, Greenpeace](#)

H&M's commitment to Zero Discharge of Hazardous Chemicals

*During 2011, **H&M and Greenpeace engaged to further contribute to the for many years shared ambition to eliminate the use of hazardous chemicals**, and hence achieve zero discharge of such substances in textile production.*

*'**We recognize the need for continuous review** of the identification process and elimination of hazardous substances based on the intrinsic properties science.'*

*'As a leading actor with a well reputed Chemicals Management, **H&M has the size and ability to encourage change within the industry**. H&M therefore recognizes the importance of cooperation; the industry must act together to achieve zero discharge.'*

Important points in our commitment:

- We commit to a more transparent chemical management, including **inventorising** of hazardous chemicals used and released across the supply chain
- We will increase the public availability and transparency of our restricted substance list and audit process and will set up **public disclosure of discharges of hazardous chemicals in our supply chain**.

[Our Action Plan](#)

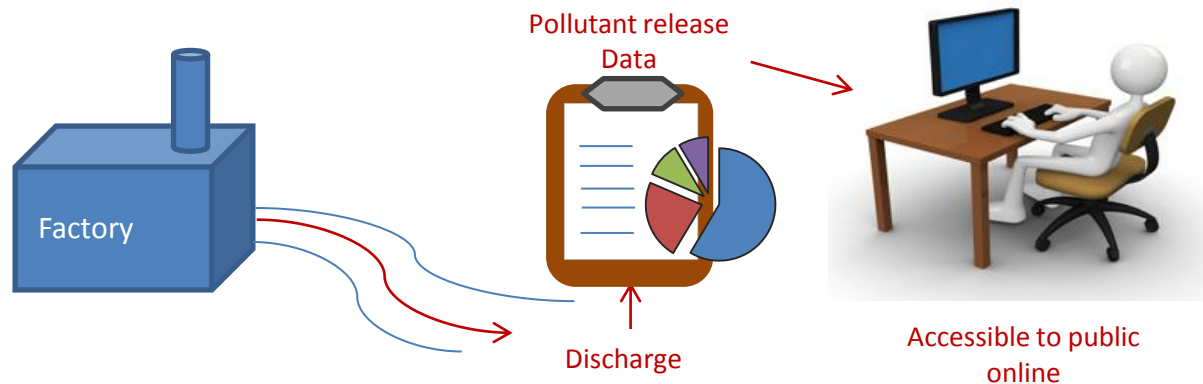
Public disclosure of discharges

*'We recognize that mechanisms for disclosure and transparency about the hazardous chemicals used in our global supply chains are important and necessary. In line with the right to know principle we will **increase the public availability and transparency of our restricted substance list and audit process and will set up public disclosure of discharges of hazardous chemicals in our supply chain**'*

Right to know: *'defined as practices that allow members of the public access to environmental information- in this case specifically about the use and discharges of chemicals based on reported quantities of releases of hazardous chemicals to the environment.'*

[Towards ZDHC](#)

Existing systems in US, EU and Japan for public disclosure: PRTR- Pollutant Release and Transfer Register

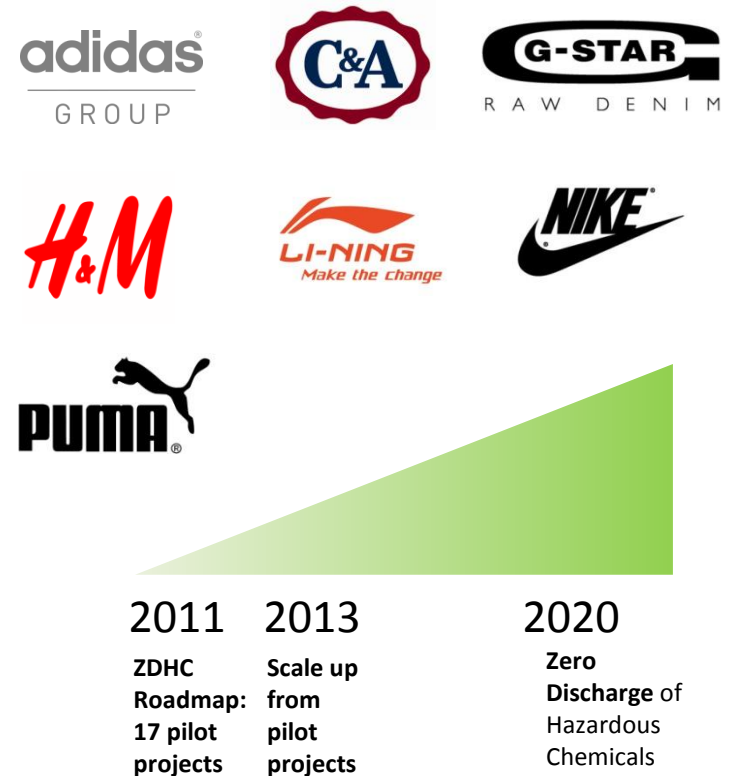


Our action plan: Joint Roadmap

*'As part of our shared commitment to help lead the apparel industry towards eliminating hazardous chemicals and to achieve zero discharges of such by 2020, H&M has **together with adidas Group, C&A, Li Ning, NIKE, Inc. and Puma** developed a joint roadmap. It is an ambitious plan, one that sets a new standard of environmental performance for the global apparel and footwear industry.'*

Summary:

- Released in November 2011
- H&M together with Adidas Group, C&A, LiNing, Nike Inc., and Puma
- G-Star joined the brands group in January 2012
- First step in our commitment towards ZDHC by 2020
- 17 pilot projects in this roadmap
 - Verifying that nine classes of hazardous or persistent chemicals are not currently used
 - Initiating an inventory of all chemicals used in apparel manufacturing by the end of 2012
 - Disclosing the results of all pilots and studies undertaken as part of this commitment
 - Geographical regions: China, Bangladesh, India, but not limited.
 - Scope focus: Vertically integrated, water intensive, chemical intensive
- **Intention to create better tools and add knowledge for effective broader roll out (next step)**



Roadmap activities: 17 Pilots

1	Benchmark study whether 9 classes of chemicals not in discharge to water or sludge using on-site visits and audits, inventories, and analytics where appropriate.
2	Develop action plan to address phase-out of any 9 chemical classes found in benchmark study.
3	Communication to suppliers to source APEO/NPE free preparations, initiate project to identify 'positive list' of APEO/NPE free detergents.
4	Conduct follow-up study at selection of facilities that have converted to APEO/NPE free detergents to identify remaining sources.
5	Confirm, or set timelines for the elimination of products that are associated with PFOA and PFOS by replacing C8 fluorinated water repellent chemistry with alternative technologies including short-chain fluorochemical water repellents approved by global regulators.
6	Develop a comprehensive, generic inventory of chemicals used in textile manufacturing.
7	Identify and agree to a cross-industry screening tool for chemical hazards.
8	Establish a plan to evaluate the chemical inventory by intrinsic hazard and establish a sector wide list of hazardous chemicals.
9	Expand our current efforts of prescribing alternative (greener) chemistries to be used on our products.

[Can be found on page 10 of Roadmap published](#)

Roadmap activities: 17 Pilots cont.'

10	Develop a joint generic audit approach for environmental performance (including chemicals management).
11	Develop a shared dye house and printer audit protocol with a competent third party.
12	Within legal confines, develop a program to incentivize suppliers to fulfill the dye house and printer audit protocol.
13	Continue expansion of individual/collective RSLs and MRSLs.
14	Develop shared approach with 3rd party for dye house and printer audit
15	Collaborate on joint training efforts and knowledge transfer and deliver a joint training program in one or more countries.
16	Convene cross sector group to explore the best ways to encourage sector wide supplier chemical disclosure and deliver a study based on data collection from a select group of facilities.
17	Explore platform options for suppliers to disclose their chemical inventory under the assumption that disclosing their inventory will have a positive effect.

[Can be found on page 10 of Roadmap published](#)

H&M's Individual Action Plan

On top of the joint roadmap, we have also made an additional [individual Action plan](#):

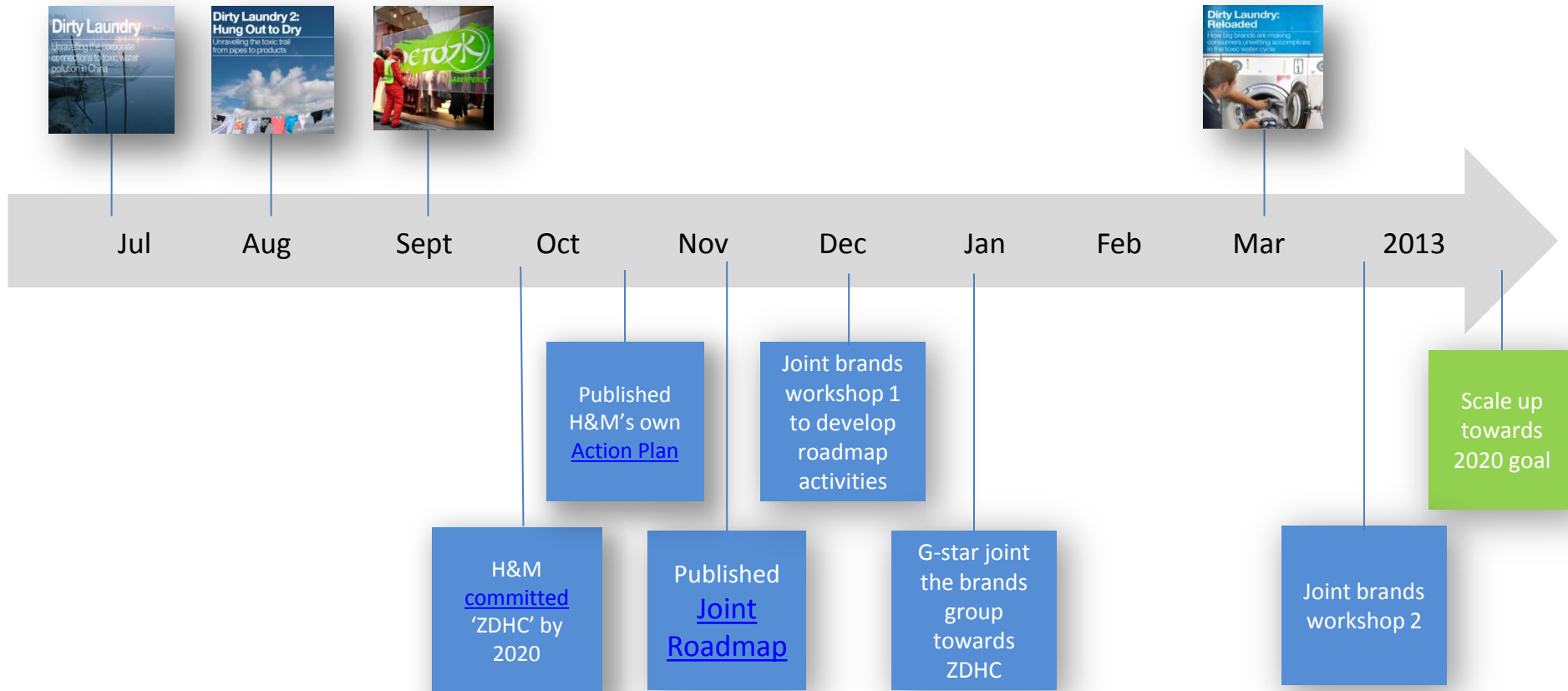
“...H&M has developed an additional [individual action plan in line with our commitment to complement the group roadmap](#). As part of our commitment to transparency, we will report on progress made through the sustainability section of our corporate website and our annual sustainability reporting.”

In the action plan, actions include:

(Not all are listed)

- Publish RSL on corporate website
- Acknowledge the ‘Right to know’ principle
- Initiate a development of an additional audit tool with specific focus on chemical management and wastewater quality monitoring
- Send reminders to all sub-suppliers on APEO usage ban
- Investigate the use of NPEs for other clients in facilities
- Investigate the indirect use of NPE containing products, for example in not production related processes such as facility maintenance, lubricant oils or similar

Summary of actions since July 2011



What to expect next

Scaling up

The idea of the roadmap is to conduct the listed 17 pilot projects, with the intention to create better tools and add knowledge for effective broader roll out.

By mid 2013, we will be in the phase of scaling up. By scaling up, we should cover a much larger scope of our supply chain. When time comes, we will conduct training seminars for suppliers and provide more information.

Meanwhile... Stay proactive!

- Go through published materials online regarding 'Zero Discharge of Hazardous Chemicals' (links can be found throughout this presentation)
- Continue to be stringent on chemicals used in production
- Remind your chemical suppliers on APEO ban